

**Remark:**

Claims 1-24 were pending. No claims have been canceled. No claims have been added. Hence, claims 1 – 24 remain pending.

**Objections to Drawings**

The drawings have been objected to as failing to comply with 37 C.F.R. 1.84(p)(5) because they purportedly include several errors. With this amendment, the specification has been amended to address items 1a. – 1e. of the Office’s objections. The amendments to the specification are shown above.

With the foregoing amendments, Applicant believes the Office’s objections to the Drawings have been addressed. As such, Applicant respectfully requests that the Objections to the Drawings be withdrawn.

**Objection to Specification**

The abstract of the disclosure is objected to because it appears to exceed the limit of 150 words. With this amendment, the Abstract has been amended to not exceed 150 words. As such, Applicant respectfully requests that the Objection to the Specification be withdrawn.

**Claim Objections**

Claims 2, 6, and 19 were objected to under 37 C.F.R. 1.75(c), as being of improper dependent form for failing to further limit the subject matter of a previous claim. Applicant respectfully traverses the objections to claims 2 and 6. Claim 19 has been amended.

Independent claim 1 recites, in part, “validating the private line *design* produced by the provisioning operation”. The Office’s objection to claims 2 and 6 are based on the step of “testing the private line *circuit* for failure”. The validating in claim 1 is with respect to the design, but, in contrast, the testing in claims 2 and 6 are with respect to the circuit. It could be possible for the private line *design* to be considered valid, but for the private line *circuit* to nonetheless fail. For example, such a situation may occur when there are “erroneous indications of availability of a segment or port” in a network “asset database [that] represents...what the network provider *believes* is available.” See Application at p. 5, ll. 14 – 15; p. 6, ll. 1 – 2. As

such, Applicant believes that the “testing” steps in claims 2 and 6 further limit the subject matter of claim 1. As such, Applicant requests that the objections to claims 2 and 6 be withdrawn.

With this amendment, claim 19 has been amended to recite, in part, “error test means for testing the *configured network elements and segments* to detect errors in the validated circuit design.” Test means in amended claim 19 tests the configured network elements and segments, rather than the design. Applicant therefore believes that claim 19 further limits the subject matter of claim 18 for reasons similar to those shown above for claims 2 and 6. As such, Applicant requests that the objection to claim 19 be withdrawn.

### **Rejections under 35 U.S.C. § 103(a)**

All of the claims, in three groups, were rejected under 35 U.S.C. § 103(a) based on three combinations of references. Each group of rejections is discussed below.

### **Rejections of Claims 1 - 6**

The Office Action rejects claims 1 – 6 under 35 U.S.C. 103(a) as purportedly being unpatentable over Doshi et al. (Overview of INDT – A new Tool for Next Generation Network Design) (hereafter, Doshi) in view of Russ et al. (U.S. Patent No. 5,841,759) (hereafter, Russ). Applicant traverses these rejections.

For ease of discussion, claim 1 is reproduced here:

Claim 1. An automated method for delivering a private line in a communication network to a customer comprising the computer implemented operations of:

provisioning components in the network to provide a private line design;

validating the private line design produced by the provisioning operation;

retrying the provisioning operation and the validating operation, if the private line design is not valid;

configuring the network to build a private line circuit in accordance with a private line design that is valid.

The Office asserts that Sections 1 and 2 of Doshi disclose “provisioning components in the network to provide a private line design[;],” “retrying the provisioning operation...” and

“configuring the network to build a private line circuit in accordance with a private line design...” Applicant respectfully disagrees.

Doshi discloses a tool that “includes a variety of network design algorithms,” and that is “intended for designing private line networks, switched voice networks, and integrated ATM based multimedia networks.” *See Doshi at Abstract*. Doshi describes two versions of the design system: an unconstrained version that generates a design assuming no embedded base, and a constrained version that takes the embedded network base as input. *See Id.*

Neither version of Doshi’s design system perform “configuring the network to build a private line circuit in accordance with a private line design,” as is recited in claim 1. Doshi simply generates a design. For example, section 2.1.3 of Doshi is titled “Network **Design** Algorithm Overview” (emphasis added), and discusses generating “an initial design of the SN interconnection network.” Section 2.2.2 is titled “Access **Design**” (emphasis added) and describes generating an access design algorithm including two steps. Section 2.2.3 is titled “Backbone **Design** and Optimization” (emphasis added) describes choosing an initial topology and size network components to meet backbone traffic demand. There are numerous other examples throughout Doshi that make it clear that Doshi merely generates a network design. (See e.g., Section 3 “The goal of the overall architecture is to be able to design integrated multimedia networks...”).

Simply put, Doshi does not disclose or suggest at least the explicitly recited act of “configuring the network to build a private line circuit in accordance with a private line design,” nor has the Office has pointed to such a disclosure or suggestion in Doshi, with any reasonable specificity. With that said, the outstanding obviousness rejection of claim 1 is based on an erroneous reading of Doshi and therefore believed improper. Because Doshi does not teach at least one limitation for which it’s asserted to teach and because the Office Action does not put forth any other prior art for teaching this limitation, the Office Action necessarily fails to prove the existence of each and every limitation recited in claim 1 in the cited art, thereby failing to establish a prima facie case of obviousness. *See MPEP §706.02(j)*.

Furthermore, the Office Action admits, and the Applicant agrees, that Doshi fails to disclose validating or retrying the provisioning operation in response to a failed validation and consequently cites Russ to reject claim 1 under 35 U.S.C. §103(a). Office Action, at page 4 (“Russ et al. discloses a method of testing a network *path* in order to ensure validity in column 2

lines 6-7.”). However, as articulated in more detail below, this rejection is believed to be improperly based on a prior art combination that fails to support a prima facie case of obviousness under 35 U.S.C. §103(a) in multiple respects. *See MPEP §706.02(j)*. First, Russ does not account for the above-stated deficiency in Doshi and is further deficient in failing to teach the added limitations of validating or retrying the provisioning operation, as improperly asserted in the Office Action. Indeed, Russ is not even concerned with provisioning network components to provide a private line *design*. Russ is instead directed to the restoration of communications path and verifying restored communications paths during network operations. Russ has no relation whatsoever to a private line *design*, let alone provisioning such a design and validating such a design. Accordingly, the combination of Russ and Doshi collectively fail to teach or suggest all limitations recited in claim 1 and, thus, fail to constitute a proper combination for which to support a prima facie case of obviousness. *See MPEP §2143.03* (citing *In re Royka*, 490 F.2d 981, 180 U.S.P.Q. 580 (CCPA 1974)).

Additionally, and notwithstanding the blatant deficiencies in this asserted combination, the Office Action fails to properly assert a suggestion or motivation in the cited references or in the knowledge generally available to one of ordinary skill in the prior art to combine Russ with Doshi. *See MPEP §2143.03* (citing *In Re Rouffet*, 149 F.3d 1350, 1357 (Fed.Cir. 1998)). Indeed, Doshi and Russ are directed to two entirely different concepts – network design (Doshi) and network restoration (Russ). There is no disclosure in either reference nor does the Office Action point to any such evidence implicit in the prior art to provide the motivation, suggestion or teaching to combine these references. Simply stated, the Office Action must prove (and in this case it certainly does not) such a motivation or, in the least, the desirability of making the specific combination that was made by the applicant. *See In re Dance*, 160 F.3d 1339, 1343, 48 USPQ2d 1635, 1637 (Fed. Cir. 1998).

While citing col. 1, lines 54-67 to teach that a “new line may use many previously unused spare parts and thus be checked for integrity,” Applicant respectfully submits that this passage does not provide motivation for modifying Russ to provide a validation routine for use in designing private lines. Indeed, Russ is only referring to the replacement of spare parts in a network, which is in no way concerned with network design and provisioning therefore. For at least this reason, Applicant respectfully submits that the motivation provided in the Office

Action is entirely out of context, and thus, cannot provide the requisite motivation required in the Federal Circuit precedent cited above.

In view of the foregoing, claim 1 is believed distinguishable over Doshi, by itself as well as in combination with Russ, as are claims 2-6, each of which depends directly or indirectly from claim 1.

### **Rejections of Claims 7 – 9 and 11**

The Office Action rejects claims 7 – 9, and 11 under 35 U.S.C. § 103(a) as purportedly being unpatentable over Doshi in view of Kondo et al. (U.S. Patent No. 5,586,254) (hereafter, Kondo) further in view of Commerford et al. (U.S. Patent No. 6,134,671) (hereafter Commerford). Applicant traverses these rejections.

Claim 7 is reproduced here for ease of discussion:

Claim 7. An automated system for delivering network service in a communications network, the automated system comprising:  
a routing engine finding an optimal route for the network service;  
a provisioning system creating a circuit design of network components for the route and assigning the network components based on network records;  
a service management system configuring and activating network components in the design based on actual network components in the network;  
a command control engine controlling the routing engine, the provisioning system and the service management system to deliver the network service; and  
said command control engine, if bad network components are detected during provisioning or configuring, controlling the routing engine, the provisioning system and the service management system to retry delivering the network service with another route and circuit design.

As an initial matter, the Office has not considered claim 7 “as a whole” as required in *MPEP 2142.02 I*. The Office has not shown with any reasonable specificity a disclosure in Doshi of at least *a routing engine, a command control engine or a service management system*. The Office’s rejection distills the invention of claim 7 down to a “gist” by essentially disregarding these express limitations in claim 7. As such, the Office has failed to set forth a prima facie case of obviousness.

Furthermore, as discussed above with respect to claim 1, Doshi *generates a design*. “The *goal* of Doshi’s overall [INDT] architecture is to be able to *design* integrated multimedia networks on a variety of network platforms.” Doshi, section 3 (emphasis added). Designing a

network or circuit and delivering service via the network are two distinct steps, and the Office's rejections utterly disregard this distinction. In short, Doshi simply does not disclose a system that *delivers the network service*. For this reason alone, claim 7 is allowable over the cited art.

Furthermore, the Office admits, and the Applicant agrees, that Doshi does not disclose a service management system configuring and activating network components in the design based on actual network components in the network or said command control engine, if bad network components are detected during provisioning or configuring, controlling the routing engine, the provisioning system and the service management system to retry delivering the network service with another route and circuit design. The Office asserts that Kondo and Commerford make up for Doshi's deficiencies. Here again, Applicant respectfully disagrees.

The Office asserts that Kondo discloses a service management system configuring and activating network components in the design based on actual network components in the network, and that it would have been obvious to combine Kondo and Doshi because doing so lightens the workload of network managers. The Office asserts that delivering the network service with another route and circuit design if bad network components are found, and that it would have been obvious to combine Commerford with Doshi because there is recognized to be a need for dynamic rerouting based upon accurate network architecture.

The Office has not provided *any* motivation or suggestion to combine Kondo and Commerford. As noted above, in order to support a *prima facie* case of obviousness, there *must* be *some suggestion* in the references themselves or in the knowledge generally available to one of ordinary skill in the art, to modify the reference or to combine reference teachings. *See MPEP §2142*. Furthermore, *it is the duty of the Examiner to explain why the combination of the teachings is proper*. *See Id.* The Examiner bears the initial burden of factually supporting any *prima facie* conclusion of obviousness. *See Id.*

If, as in the present case, the Examiner "does not produce a *prima facie* case, the applicant is *under no obligation* to submit evidence of nonobviousness." *See Id (emphasis added)*. In the event that the Office believes a proper motivation or suggestion has been provided to combine Commerford and Kondo, Applicant specifically traverses any such assertion. As such, if the Office chooses to maintain this rejection, Applicant requests that the Office provide some reasonable motivation or suggestion to combine Kondo and Commerford.

For at least the reasons given above, claim 7 and its respective dependent claims are believed to be allowable.

#### **Rejections of Claims 10 and 12 – 24**

The Office Action rejects claims 10 and 12 – 23, and 11 under 35 U.S.C. § 103(a) as purportedly being unpatentable over Doshi in view of Kondo further in view of Commerford further in view of Russ. Applicant traverses these rejections.

The Office admits, and Applicant agrees, that Doshi, Kondo, and Commerford do not disclose (a) a validating module validating the circuit design against the network records and indicating a bad network component that cannot be validated (claim 10), or (b) validity testing (claim 12, 16). The Office asserts that Russ makes up for the deficiencies of all the foregoing references.

Again, the Office has not provided any motivation or suggestion to combine Kondo with Commerford. In addition, the Office has not provided any motivation or suggestion to combine Kondo and Russ or Commerford and Russ. As discussed above, *it is the duty of the Examiner to explain why the combination of the teachings is proper*. See MPEP §2142. If, as in the present case, the Examiner does not produce a *prima facie* case, the applicant is *under no obligation* to submit evidence of nonobviousness. See *Id.*

As such, the Office has failed to provide a *prima facie* case of obviousness with respect to claims 10 and 12 – 23. For at least this reason, claims 10 and 12 – 23 are believed to be allowable.

In addition, in its rejection of claim 10, the Office asserts that Russ discloses a method of testing a network path, and apparently relies on this assertion as a teaching of “validating a circuit *design*”. As discussed above, this rejection is inappropriate because validating a circuit design is distinct from testing a network path. Therefore Russ cannot be relied on for a teaching of validating a design and the Office has not shown any disclosure in the prior art of “validating a circuit design”. For at least this additional reason, claim 10 is believed to be allowable.

Furthermore, claim 18 and its dependents are “means plus function” claims. Such claims shall be construed to cover the corresponding structure, material, or acts described in the specification and equivalents thereof. The Office’s rejection of claim 18 and its dependents relies on its rejection of claim 16, which relies on the rejection of claim 7. As discussed above

with respect to claim 7, the Office's rejection merely lumps together the claim elements and refers generally to sections 1 – 2 of Doshi as disclosing those elements. Reliance on the rejection of claim 7 to reject the "means plus function" claim 18 is inappropriate, for at least the reason that such a rejection fails to consider the corresponding structure, material, or acts described in the specification and equivalents thereof.

For at least this additional reason, claims 18 – 24 are believed to be allowable.

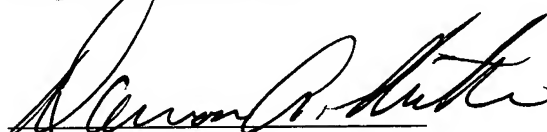
### **Conclusion**

This Amendment and the foregoing remarks fully respond to the Office Action mailed on October 31, 2005. Still, the Office Action may contain arguments and rejections that are not directly addressed by this Amendment due to the fact that they are rendered moot in light of the preceding arguments in favor of patentability. Hence, failure of this Amendment to directly address an argument raised in the Office Action should not be taken as an indication that the Applicant believes the argument to have merit. Furthermore, the claims of the present application may include other elements, not discussed in this Amendment, which are not shown, taught, or otherwise suggested by the art of record. Accordingly, the preceding arguments in favor of patentability are advanced without prejudice to other bases of patentability.

Should the Examiner have any remaining questions or concerns, he/she is encouraged to contact the undersigned attorney by telephone (303-447-7739) to expeditiously resolve such concerns. Because this Amendment is being filed after January 31, 2006, but prior to March 31, 2006, please charge the requisite fees due under 37 C.F.R. §1.136(a) to maintain pendency of this application to the credit card identified in the enclosed PTO Credit Card Payment Form 2038. No other fees are believed due for submission of this Amendment. However, if this is not the case, please charge any such fees to Deposit Account No. 06-0029. Alternatively, please credit any overpayment to the same Deposit Account.

Dated: March 30, 2006

Respectfully submitted,



Damon A. Rieth  
Registration No. 52,167  
Attorney for Applicant  
Customer No. 35657